AMENDMENTS TO THE SPECIFICATION

Please amend paragraph [0040] on page 7 as follows:

According to the present invention, as shown in Fig. 6(c), the heat quantity Q generated by the forward clutch 21 and reverse clutch 22 during gear shifting is reduced in comparison with the comparison example by the extent indicated by a cross-hatched region r, and the load applied to the forward clutch 21 and reverse clutch 22 is also reduced by that extent. This is because the input clutch 10 is in the power-transmittable sliding state during gear shifting so that a part of the load on the forward clutch 21 and reverse clutch 22 is shared by the input clutch 10 and the heat quantity Q indicated by the cross-hatched region s corresponding to the cross-hatched region r is generated in the input clutch 10.

Please amend paragraph [0042] on page 8 as follows:

Therefore, even if gear shifting is performed without lowering the vehicle speed and with the engine speed kept high, the load applied to the gear shift clutches 21 and 22 of the transmission 20 is decreased. This retards the progress of the wear in the clutches and prolongs the cycle to disassemble the interior of the transmission 20 to replace the clutches 21 and 22. As ~~the~~a result, the burden of the work to replace the clutch 21 and 22 of the transmission 20 can be mitigated. Moreover, the work to replace the input clutch 10 or the like can be performed easily because there is no need of disassembling the transmission 20.

Please amend paragraph [0069] on page 12 as follows:

Subsequently, according to the clutch pressure command signal (time varying pattern of the clutch pressure), the gear shift clutch control valve 4 starts supplying hydraulic oil to the forward clutch 21 to fill the clutch chamber therewith, at a time tI that is earlier than time tc at which the clutch pressure Pt of the reverse clutch 22 becomes substantially zero, by a minute time period τf. When the clutch chamber of the forward clutch 21 is filled with the pressure oil (the filling is completed) at a time tB, a fill signal is input to the controller 16 by the fill sensor

detecting this. Upon receiving the fill signal at the filling time tB, the controller 16 then gradually increases (builds up) the clutch pressure Pt from the pressure P2 at the completion of filling to the set pressure P1 to establish the completely connected state. The clutch pressure Pt of the forward clutch 21 reaches the set pressure P1 at which the completely connected state is established, at a time tD (step 103).

Please amend paragraph [0090] on page 18 as follows:

As shown in Figs. 7(a) and 7(b), the clutch pressure Pm of the input clutch 10 may be reduced at the time tA when the cut-off operation of the reverse clutch 22 is started (at a time before the filling time tB at which the clutch chamber of the selected forward clutch 21 to be used after the gear shifting is filled with the pressure oil), and the clutch pressure Pm of the input clutch 10 ~~ma~~may be raised after time tD when the connecting operation of the forward clutch 21 is completed.

Please amend paragraph [0099] on page 20 as follows:

Fig. 1 is a block diagram of a transmission control device for a work vehicle according to an embodiment, showing a part of a configuration of a wheel loader relating to the present invention;

Fig. 2 is a flowchart of a gear shift control method, showing the flow of processing performed by a controller;

Fig. 3 is a flowchart corresponding to Fig. 2, but showing the flow of processing according to another embodiment;

Fig. 4 is a flowchart corresponding to Fig. 2, but showing the flow of processing according to another embodiment;

Fig. 5 is a flowchart corresponding to Fig. 2, but showing the flow of processing according to another embodiment;

Fig. 6(a) is a diagram showing correlation between time and clutch pressures of the forward and reverse clutches, Fig. 6(b) ~~beingis~~ a diagram showing time variation of the clutch

pressure of the input clutch while using the abscissa axis of Fig. 6(a) in common as the time axis, and Fig. 6(c) ~~being~~is a diagram showing time variation of the heat quantities generated in the forward clutch, reverse clutch, and input clutch while using the abscissa axis of Fig. 6(a) in common as the time axis;

Figs. 7(a) and 7(b) are diagrams for explaining another embodiment, and ~~corresponding~~correspond to Figs. 6(a) and 6(b), respectively;

Figs. 8(a) and 8(b) are diagrams for explaining another embodiment, and ~~corresponding~~correspond to Figs. 6(a) and 6(b), respectively; and

Figs. 9(a) and 9(b) are diagrams for explaining another embodiment, and ~~corresponding~~correspond to Figs. 6(a) and 6(b), respectively.